



DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2022-1488; Project Identifier MCAI-2022-00788-R; Amendment 39-22391; AD 2023-06-05]

RIN 2120-AA64

Airworthiness Directives; Bell Textron Canada Limited Helicopters

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: The FAA is adopting a new airworthiness directive (AD) for all Bell Textron Canada Limited Model 206A, 206A-1 (OH-58A), 206B, 206B-1, 206L, 206L-1, 206L-3, and 206L-4 helicopters. This AD was prompted by a loss of tail rotor (TR) drive due to a failure of an adhesively bonded joint between an adapter and a tube on one of the segmented TR drive shaft (TRDS) assemblies. This AD requires determining if an affected TRDS is installed; repetitively inspecting the bond line for damage; repetitively performing a proof load test of the TRDS assembly; and depending on the results of the inspections or the proof load tests, removing an affected TRDS from service and replacing it with a serviceable TRDS. This AD also prohibits installing a TRDS unless it meets certain requirements, as specified in a Transport Canada AD, which is incorporated by reference. The FAA is issuing this AD to address the unsafe condition on these products.

DATES: This AD is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

The Director of the Federal Register approved the incorporation by reference of a certain publication listed in this AD as of [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES:

AD Docket: You may examine the AD docket at [regulations.gov](https://www.regulations.gov) under Docket No. FAA-2022-1488; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday

through Friday, except Federal holidays. The AD docket contains this final rule, any comments received, and other information. The address for Docket Operations is U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE, Washington, DC 20590.

Material Incorporated by Reference:

- For Transport Canada material that is incorporated by reference in this final rule, contact Transport Canada, Transport Canada National Aircraft Certification, 159 Cleopatra Drive, Nepean, Ontario, K1A 0N5, CANADA; telephone 888-663-3639; email TC.AirworthinessDirectives-Consignesdenavigabilite.TC@tc.gc.ca; Internet tc.canada.ca/en/aviation.

- You may view this material at the FAA, Office of the Regional Counsel, Southwest Region, 10101 Hillwood Pkwy., Room 6N-321, Fort Worth, TX 76177. For information on the availability of this material at the FAA, call (817) 222-5110. It is also available at regulations.gov under Docket No. FAA-2022-1488.

Other Related Service Information: For Bell service information identified in this final rule, contact Bell Textron Canada Limited, 12,800 Rue de l'Avenir, Mirabel, Quebec J7J 1R4, Canada; telephone 1-450-437-2862 or 1-800-363-8023; fax 1-450-433-0272; email productsupport@bellflight.com; or at bellflight.com/support/contact-support. This service information is also available at the FAA contact information under *Material Incorporated by Reference* above.

FOR FURTHER INFORMATION CONTACT: Kristi Bradley, Program Manager, COS Program Management Section, Operational Safety Branch, Compliance & Airworthiness Division, FAA, 10101 Hillwood Pkwy., Fort Worth, TX 76177; telephone (817) 222-5110; email kristin.bradley@faa.gov.

SUPPLEMENTARY INFORMATION:

Background

Transport Canada, which is the aviation authority for Canada, has issued Transport Canada AD CF-2022-33, dated June 15, 2022 (Transport Canada AD CF-2022-33), to correct an unsafe condition for Bell Textron Canada Limited Model 206A,

206A-1, 206B, 206B-1, 206L, 206L-1, 206L-3 and 206L-4 helicopters, all serial numbers.

The FAA issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to Bell Textron Canada Limited Model 206A, 206A-1 (OH-58A), 206B, 206B-1, 206L, 206L-1, 206L-3, and 206L-4 helicopters, all serial numbers.

The NPRM published in the *Federal Register* on November 28, 2022 (87 FR 72899). The NPRM was prompted by a report in which a Bell Textron Canada Limited Model 206L-1 helicopter experienced loss of TR drive during a maintenance test flight, which was due to a failure of an adhesively bonded joint between an adapter and a tube on one of the segmented TRDS assemblies. The NPRM proposed to require determining if an affected TRDS is installed; repetitively inspecting the bond line for damage; repetitively performing a proof load test of the TRDS assembly; and depending on the results of the inspections or the proof load tests, removing an affected TRDS from service and replacing it with a serviceable TRDS. The NPRM also proposed to prohibit installing a TRDS unless it meets certain requirements, as specified in Transport Canada AD CF-2022-33.

Discussion of Final Airworthiness Directive

Comments

The FAA received comments from one individual commenter. The following presents the comments received on the NPRM and the FAA's response to each comment.

Request To Not Incorporate the Transport Canada AD by Reference

One individual requested that the FAA not reference Transport Canada AD CF-2022-33 in the FAA AD. The commenter stated Transport Canada AD CF-2022-33 either repeats the instructions found in the alert service bulletin (ASB) or directs the reader to the ASB. Additionally, the commenter stated referencing Transport Canada ADs is a new practice and the Transport Canada ADs should only be referenced if they make a substantial addition to the ASB requirements.

The FAA disagrees with both the request to not require compliance with Transport Canada AD CF-2022-33 in the FAA AD and the request to discontinue the

method of requiring compliance with some foreign ADs issued by the foreign state of design authority. In the FAA's ongoing efforts to improve the efficiency of the AD process, the FAA developed a process to use some civil aviation authority ADs as the primary source of information for compliance with requirements for corresponding FAA ADs. FAA ADs that require compliance with foreign ADs have been utilized since 2018 for some products and since 2022 for Bell Textron Canada Limited helicopters. Referring to Transport Canada AD CF-2022-33 minimizes the need for Alternative Methods of Compliance.

Conclusion

These helicopters have been approved by the aviation authority of Canada and are approved for operation in the United States. Pursuant to the FAA's bilateral agreement with Canada, Transport Canada, its technical representative, has notified the FAA of the unsafe condition described in its AD. The FAA reviewed the relevant data, considered the comments received, and determined that air safety requires adopting this AD as proposed. Accordingly, the FAA is issuing this AD to address the unsafe condition on these helicopters. This AD is adopted as proposed in the NPRM.

Related Service Information Under 1 CFR Part 51

Transport Canada AD CF-2022-33 requires determining if a helicopter has an affected TRDS installed. If there is an affected TRDS installed, Transport Canada AD CF-2022-33 requires performing a repetitive detailed inspection of the bond line of the inboard end of the flange and, if there is damage, replacing the affected TRDS with a serviceable TRDS. Transport Canada AD CF-2022-33 also requires performing a repetitive proof load test of the TRDS assembly and replacing any TRDS that fails the proof load test. Transport Canada AD CF-2022-33 also prohibits installing a TRDS unless certain requirements are met.

This material is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the ADDRESSES section.

Other Related Service Information

The FAA also reviewed Bell ASB 206-20-139, Revision A, dated August 21, 2020 for Model 206A, 206B, and TH-67 helicopters, and Bell ASB 206L-20-184, Revision C, dated January 14, 2021 for Model 206L, 206L-1, 206L-3, and 206L-4 helicopters. This service information specifies procedures for repetitive detailed visual inspections and proof load tests of installed bonded TRDSs, and replacement of an affected bonded TRDS that fails a visual inspection or proof load test with a serviceable segmented bonded TRDS or a riveted TRDS. This service information also specifies that replacing all the bonded TRDS assemblies with riveted TRDS assemblies is a terminating action for the repetitive visual inspections and proof load tests.

The FAA reviewed Bell Helicopter Technical Bulletin (TB) No. 206-06-186, Revision B, dated September 7, 2007, and Bell Helicopter Textron TB No. 206L-02-207, Revision A, dated January 22, 2003, which both specify procedures for installing a riveted TRDS and rotor break disc; inspecting the aft short shaft and driveshaft assemblies; and stripping and painting the aft short shaft and driveshaft assemblies.

Differences Between this AD, the Transport Canada AD, and the Service Information

Where the service information referenced in Transport Canada AD CF-2022-33 specifies recording certain information in the event of a bond line failure and notifying Bell Product Support Engineering of the findings, this AD does not require recording any information or reporting any information to Bell Product Support Engineering.

Costs of Compliance

The FAA estimates that this AD affects 1,395 helicopters of U.S. Registry. Labor rates are estimated at \$85 per work-hour. Based on these numbers, the FAA estimates the following costs to comply with this AD.

Determining if an affected TRDS is installed takes about 0.5 work-hour for an estimated cost of \$43 per helicopter and \$59,985 for the U.S. fleet.

Inspecting the bond line and performing a proof load test takes about 1.5 work-hours for an estimated cost of \$128 per helicopter per inspection cycle.

Replacing an affected TRDS assembly takes about 12 work-hours and parts cost up to \$32,708 for an estimated cost of up to \$33,728 per helicopter.

Authority for this Rulemaking

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, section 106, describes the authority of the FAA Administrator. Subtitle VII: Aviation Programs, describes in more detail the scope of the Agency's authority.

The FAA is issuing this rulemaking under the authority described in Subtitle VII, Part A, Subpart III, Section 44701: General requirements. Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

Regulatory Findings

This AD will not have federalism implications under Executive Order 13132. This AD will not have a substantial direct effect on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that this AD:

- (1) Is not a "significant regulatory action" under Executive Order 12866,
- (2) Will not affect intrastate aviation in Alaska, and
- (3) Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

The Amendment

Accordingly, under the authority delegated to me by the Administrator, the FAA amends 14 CFR part 39 as follows:

PART 39 - AIRWORTHINESS DIRECTIVES

- 1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

§ 39.13 [Amended]

2. The FAA amends § 39.13 by adding the following new airworthiness directive:

2023-06-05 Bell Textron Canada Limited: Amendment 39-22391; Docket No.

FAA-2022-1488; Project Identifier MCAI-2022-00788-R.

(a) Effective Date

This airworthiness directive (AD) is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

(b) Affected ADs

None.

(c) Applicability

This AD applies to Bell Textron Canada Limited Model 206A, 206A-1 (OH-58A), 206B, 206B-1, 206L, 206L-1, 206L-3, and 206L-4 helicopters, all serial numbers, certificated in any category.

(d) Subject

Joint Aircraft Service Component (JASC) Code: 6510, Tail Rotor Drive Shaft.

(e) Unsafe Condition

This AD was prompted by a loss of tail rotor (TR) drive due to a failure of an adhesively bonded joint between an adapter and a tube on one of the segmented TR drive shaft (TRDS) assemblies. The FAA is issuing this AD to detect degradation of the adhesive bond of the TRDS assembly. The unsafe condition, if not addressed, could result in loss of TR drive and subsequent loss of control of the helicopter.

(f) Compliance

Comply with this AD within the compliance times specified, unless already done.

(g) Requirements

Except as specified in paragraphs (h) and (i) of this AD: Comply with all required actions and compliance times specified in, and in accordance with, Transport Canada AD CF-2022-33, dated June 15, 2022 (Transport Canada AD CF-2022-33).

(h) Exceptions to Transport Canada AD CF-2022-33

(1) Where Transport Canada AD CF-2022-33 requires compliance in terms of air time, this AD requires using hours time-in-service (TIS).

(2) Where Transport Canada AD CF-2022-33 refers to its effective date, this AD requires using the effective date of this AD.

(3) Where Transport Canada AD CF-2022-33 defines “Affected TRDS,” for this AD replace each instance of the text “affected TRDS,” with “a TRDS with a part number (P/N) that is not one of the riveted TRDS P/Ns listed in the accomplishment instructions of Bell Alert Service Bulletin (ASB) 206-20-139, Revision A, dated August 21, 2020 (ASB 206-20-139 Rev A) or Bell ASB 206L-20-184, Revision C, dated January 14, 2021 (ASB 206L-20-184 Rev C) as applicable to your model helicopter.”

(4) Where Transport Canada AD CF-2022-33 defines “Serviceable part,” for this AD replace each instance of the text “serviceable part,” with “a riveted TRDS with a P/N that is listed in the accomplishment instructions of ASB 206-20-139 Rev A or ASB 206L-20-184 Rev C as applicable to your model helicopter; or an affected TRDS that has been inspected and proof load tested in accordance with the requirements of this AD within the past 300 hours TIS or within the last 12 months, whichever occurs first.”

(5) Where the service information referenced in Transport Canada AD CF-2022-33 specifies scrapping or discarding a part, this AD requires removing that part from service.

(6) Where the service information referenced in Transport Canada AD CF-2022-33 specifies in the event of a bond line failure, recording the torque value at which it failed, the affected shaft position, part number, serial number, and which end failed, and notifying Bell Product Support Engineering of the findings, this AD does not require recording any discrepancies or reporting any information to Bell Product Support Engineering.

(i) No Reporting Requirement

Although the service information referenced in Transport Canada AD CF-2022-33 specifies to submit certain information to the manufacturer, this AD does not include that requirement.

(j) Special Flight Permit

Special flight permits are prohibited.

(k) Alternative Methods of Compliance (AMOCs)

(1) The Manager, International Validation Branch, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local Flight Standards District Office, as appropriate. If sending information directly to the manager of the International Validation Branch, send it to the attention of the person identified in paragraph (l) of this AD. Information may be emailed to: 9-AVS-AIR-730-AMOC@faa.gov.

(2) Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office.

(l) Related Information

For more information about this AD, contact Kristi Bradley, Program Manager, COS Program Management Section, Operational Safety Branch, Compliance & Airworthiness Division, FAA, 10101 Hillwood Pkwy., Fort Worth, TX 76177; telephone (817) 222-5110; email kristin.bradley@faa.gov.

(m) Material Incorporated by Reference

(1) The Director of the Federal Register approved the incorporation by reference of the service information listed in this paragraph under 5 U.S.C. 552(a) and 1 CFR part 51.

(2) You must use this service information as applicable to do the actions required by this AD, unless this AD specifies otherwise.

(i) Transport Canada AD CF-2022-33, dated June 15, 2022.

(ii) [Reserved]

(3) For Transport Canada service information identified in this AD, contact Transport Canada, Transport Canada National Aircraft Certification, 159 Cleopatra Drive, Nepean, Ontario, K1A 0N5, CANADA; telephone 888-663-3639; email TC.AirworthinessDirectives-Consignesdenavigabilite.TC@tc.gc.ca; Internet tc.canada.ca/en/aviation.

(4) You may view this service information at the FAA, Office of the Regional Counsel, Southwest Region, 10101 Hillwood Pkwy., Room 6N-321, Fort Worth, TX 76177. For information on the availability of this material at the FAA, call (817) 222-5110.

(5) You may view this material that is incorporated by reference at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, email fr.inspection@nara.gov, or go to: www.archives.gov/federal-register/cfr/ibr-locations.html.

Issued on March 16, 2023.

Christina Underwood, Acting Director,
Compliance & Airworthiness Division,
Aircraft Certification Service.

[FR Doc. 2023-07779 Filed: 4/13/2023 8:45 am; Publication Date: 4/14/2023]